



Rising to the Call

By

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One of the key military and political leaders of the 20th century, President Dwight Eisenhower, in 1953 called on all nations, with the United States in a leadership role, to move beyond military use of the atom – toward Atoms for Peace. He foresaw a world where the atom would be put to use in a wide range of applications from medicine to agriculture. A special purpose he envisioned was to provide abundant electrical energy to power-starved areas.

In Idaho, the National Reactor Testing Station, forerunner of today's INL, rose to take on the president's challenge. Less than two years after President Eisenhower's "Atoms for Peace" address, pioneering Idaho engineers and scientists powered a community – Arco, Idaho – with nuclear-generated electricity for the first time in history.

Building on Idaho's unparalleled heritage of nuclear science and engineering excellence – design and construction of 52 mostly first-of-their kind nuclear reactors, contributions in nuclear medicine, cancer therapy and more – Idaho National Laboratory has been identified as the institution to lead our nation and the world in peaceful uses of nuclear energy.

This "Renaissance in Nuclear Energy" offers the opportunity to enhance our nation's energy security, and decrease the environmental impact of world energy use. It also has the potential to lead us to the use of hydrogen as a transportation fuel, nuclear-powered desalination plants to meet the world's water needs, environmentally friendly energy to support the developing world, and expansion of the exploration of space. It is this latter use of nuclear energy

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– supporting space exploration – that is the focus of a new task coming to INL. The proposed task is production of radioisotope power systems, sometimes referred to as “space batteries.” These small units provide reliable heat and electric power needed to enable space exploration and its resulting scientific breakthroughs. They are also used in support of classified National Security applications.

No other power source currently in use or on the near-term drawing board can fit the bill for these special earthbound and space applications, and no other institution in the country has the unique blend of assets and capabilities Idaho offers to consolidate operations associated with the production of radioisotope power systems.

Put simply, a national need has been identified, and Idaho stands alone in its ability to offer the requisite resources – the “right stuff,” if you will. The process will require that we handle Plutonium-238, a hazardous radioactive element. The Department of Energy has had extensive experience with handling this material and its associated processes over many years. We will build on these experiences and add our own expertise to ensure this material is handled and processed with no harm to lab personnel and no environmental consequences. Safety and environmental stewardship are our priorities at INL in all we do.

As the proposal to consolidate production of these space batteries moves forward, I promise you - you’ll be hearing more from us. We sincerely want to hear from you – our neighbors – and we look forward to this dialogue.

We in Idaho and, specifically, those of us at the Idaho National Laboratory have been asked to rise to the call to support our nation in the safe, efficient production of radioisotope power systems. Your national laboratory is ready and uniquely able to respond.

A handwritten signature in blue ink, appearing to read "Val V. Bershad". The signature is fluid and cursive, with a long horizontal stroke extending to the right.